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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/688,423	10/16/2003	Stephen Loomis	AOL00111	2234

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EXAMINER
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FLANDERS, ANDREW C

ART UNIT	PAPER NUMBER
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2644

DATE MAILED: 06/20/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

10/688,423

Applicant(s)

LOOMIS, STEPHEN

Examiner

Andrew C. Flanders

Art Unit

2644

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 09 May 2005.
- 2a) ☒ This action is FINAL. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-25 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-25 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 16 October 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

**DETAILED ACTION**

***Continued Examination Under 37 CFR 1.114***

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 9 May 2005 has been entered.

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

**Claims 1-25** are rejected under 35 U.S.C. 103(a) as being unpatentable over Berman (U.S. Patent 6,502,194) in view of Zainouline (U.S. Patent Application Publication 2001/0030660).

Regarding **Claims 1, 6 and 16**, Berman discloses as the first song (Song 1) is being played, the playback unit continues to operate and, in background operations,

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continues to download the Song 1 data into the first buffer, and also downloads data for the other selected songs into the other buffers in an alternating fashion. Each song will be placed into a different sequential buffer. (col. 12 lines 10 – 16) (i.e. as soon as a song starts to play, start to download, consecutively, a first small portion of a number of songs which are, in the predetermined sequence, subsequent to the song playing in an alternating fashion, said downloaded small portions being pre-cached in a different buffer with is an area in said second memory), this ensures that some portion of each selected song will be downloaded and available as soon as possible, thereby permitting the user to skip to one of the other selected songs after playback has begun (col. 12 lines 16 – 19) (i.e. as soon as the user skips to a target song whose first small portion has been pre-cached, start to play the first small portion of said target song; and at the same time start to download the rest of said target song so that as soon as the playing of the first small portion of said target song ends, start to play the rest of said target song which is being downloaded from the server over the internet). Berman does not disclose an apparatus comprising a processor, a first memory that stores at least one program used by said processor to control the playing of the sequence of songs, and a second memory which is available to said at least one program for operations.

Zainoulline discloses a preview device having a CPU, RAM memory, and staging memory (page 3 paragraph 0031) (i.e. the apparatus comprising a processor, a first memory and a second memory), a preview device that is also adapted to retrieve and pre-load preview clips of various pre-recorded media products stored in the media product storage device (page 3 paragraph 0031) (i.e. a first memory that stores at least

one program used by said processor to control the playing of the sequence of songs), a player program for playing the indicated preview clip and an optional secondary storage (i.e. a second memory which is available to at least one program for operations). One of ordinary skill in the art at the time of the invention would have been motivated to use Zainoulline's preview device with Berman's Memory Buffering Control playback method in order to create a more pleasing online shopping experience. Rather than a user having to wait for each individual song to buffer as they skip between preview clips, the combination would allow a user to smoothly switch between media clips thereby saving the user time and avoiding annoying pauses between playback (Zainoulline paragraph 26).

Regarding **Claims 2, 12 and 22**, in addition to the elements above regarding claim 1, Berman further discloses in the preferred embodiment each data packet contains approximately ten seconds of compressed digital audio information (col. 11 lines 50 –52) (i.e. wherein said first small portion is approximately the data required for playing the first ten seconds).

Regarding **Claim 3, 13, and 23**, in addition to the elements above regarding claim 1, Berman discloses three buffers in a playback memory in Figure 11. The playback unit memory may be segregated into a number of sequential buffers, with each buffer preferably containing one song (col. 11 lines 30 – 32) and the number of buffers is determined by the 2MB buffer size and the amount of memory that the

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playback unit microprocessor can access, so the number of buffers available will be variable (col. 11 lines 34 –38). Since microprocessor accessible memories of, for example, 256 MB, are well known at the time of the invention, Berman's disclosure comprehends any number of buffers up to at least 128.

Regarding **Claims 4, 14, and 24**, in addition to the elements stated above regarding claim 1, Berman further discloses that the buffers correspond to the following musical selections (col. 11 lines 63 – 65) and that the buffers are sequential buffers (col. 11 line 31). Berman discloses that the buffers correspond to the following musical selections as well as hold the data of the following songs to be played in sequential order. Therefore it is obvious that the said number of songs is all songs subsequent to the song in playing.

Regarding **Claims 5, 15, and 25**, in addition to the elements stated above regarding claim 1, Berman further discloses The loop buffering operation progresses from left to right in Fig 12. Loop buffering is used to limit the size needed for each buffer. In particular, a buffer is not expected to have sufficient capacity to contain the entire data needed for one song. Rather data in a given buffer is overwritten as it is processed and played. Thus, after the last segment of memory in a buffer for a song has been filled with a song data packet and that buffer is processed for listening, the next song data packet will be written to the first segment in that buffer (col. 12 lines 22 –

30) (i.e. wherein said buffer follows a first-in first-out algorithm and allows writing while reading).

Regarding **Claims 7 and 17**, Berman further discloses checking to see if the track is in the buffer and if so beginning to stream track data from memory (Fig. 5 elements 506 and 512) (i.e. as soon as the user skips from a song in the playing to a target song, checking whether a file for said target song exists in said buffer, wherein if the check result is yes, continuing on step (d); (d) playing the first small portion of said target song). As stated above regarding claim 1, Berman discloses data in a given buffer is overwritten as it is processed and played. Thus, after the last segment of memory in a buffer for a song has been filled with a song data packet and that buffer is processed for listening, the next song data packet will be written to the first segment in that buffer (col. 12 lines 25 – 30). Therefore, as the system starts downloading the rest of the said target song, it is obvious that the data that has been in the buffer prior to the target song is overwritten (i.e. deleted) as the newer data is being processed and played (i.e. deleting any pre-cached song prior to said target song in said pre-determined sequence). Elements (e) and (g) are clearly comprehended above regarding claim 1 and thus claims 7 and 17 are rejected.

Regarding **Claims 8 and 18**, in addition to the elements stated above regarding claims 7 and 17, Berman discloses that portions of each selected song will be downloaded as the first one begins to play (col. 11 lines 56 and 57), the number of

buffers may be variable (col. 11 lines 37 and 38), this ensures that some portion of each selected song will be downloaded and available as soon as possible, thereby permitting the user to skip to one of the other selected songs after playback has begun (col.12 lines 16 – 19), and as the first song (Song 1) is being played, the playback unit continues to operate and, in background operations, continues to download the Song 1 data into the first buffer, and also downloads data for the other selected songs into the other buffers in an alternating fashion. Each song will be placed into a different sequential buffer. (col.12 lines 10 – 16). It is obvious that as soon as the user skips ahead to another song, the subsequent songs will be downloaded into the buffer sequentially in order to fill the number of buffers (i.e. as soon as step (d) starts, continuing on step (a), wherein if one or more songs subsequent to said target song are already pre-cached, skipping said one or more songs and downloading the subsequent ones, executively, to make up said number.

Regarding **Claims 9 and 19**, in addition to the elements stated above regarding claims 8 and 18, Berman further discloses that if a user wants to hear Song1, Song2, and Song 3, the playback unit downloads a number of packets for Song1 into the first available buffer, Once a sizeable amount of compressed audio information is stored for that song, the playback unit begins to process the information and play the song (col.11 lines 66 and 67, col. 12 lines 1-4). It is obvious that if the user selects these three songs, starts playing Song1, and doesn't skip ahead that Song 2 will follow after Song1 has completed playing based on the functionality of the buffer (i.e. if no skip command



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is given by the user while said target song is playing, as soon as the playing of said target song ends, playing the next song immediately subsequent to said target song.)

Element (j) is clearly comprehended above regarding claim 7 and thus claims 9 and 19 are rejected.

Regarding **Claims 10 and 20**, in addition to the elements stated above regarding claims 7 and 17, Berman discloses that As the first song (Song 1 is being played, the playback unit continues to operate and, in background operation, continues to download the Song 1 data into the first buffer, and also downloads data for the other selected songs in to the other buffers into an alternating fashion (col. 12 lines 10 – 14) and if a user wants to hear Song1, Song2, and Song 3, the playback unit downloads a number of packets for Song1 into the first available buffer, Once a sizeable amount of compressed audio information is stored for that song, the playback unit begins to process the information and play the song (col.11 lines 66 and 67, col. 12 lines 1-4). Therefore, if a user starts playing Song1 and instantly skips to Song2 there will be no information stored in the buffer for Song2 therefore it is inherent that the system will stop playing Song 1 and automatically download the information for Song2 (i.e. sending request to stop transmitting of said song in playing and start transmitting said target song and playing said target song while being downloaded as soon as said buffer allows so). Elements (l), (m), and (o) are clearly comprehended above regarding claim 7 and thus claims 10 and 20 are rejected.

Regarding **Claims 11 and 21**, in addition to the elements stated above regarding claims 10 and 20, element (p) is clearly comprehended above regarding claim 9 element (j), element (q) is clearly comprehended above regarding claim 9 element (i), element (r) is clearly comprehended above regarding claim 7 element (e), element (s) is clearly comprehended above regarding claim 8 element (h), and element (t) is clearly comprehended above regarding claim 7 element (g) and thus claims 11 and 21 are rejected.

### ***Response to Arguments***

Applicant's arguments filed 9 May 2005 have been fully considered but they are not persuasive.

Applicant states:

Berman does not teach or suggest the limitations of Claims 1, 6 and 16 specifically:

1) playing the song,

Examiner respectfully disagrees. As shown in the final rejection of the previous office action dated 09 March 2005, Berman discloses playing back the first song. Examiner also points to the Berman reference at col. 12 lines 10 – 11 for further clarification.

Applicant also states:

Berman does not teach or suggest the limitations of Claims 1, 6 and 16 specifically:

2) downloading a first small portion of each of a number of songs which are, in the pre-determined sequence, subsequent to the song in playing and that the downloaded small portions being pre-cached in a different buffer which is an area in said second memory.

Examiner respectfully disagrees. As shown in the final rejection of the previous office action dated 09 March 2005, Berman discloses downloading data for the other selected songs into the other buffers in an alternating fashion, each song will be placed into a different sequential buffer. Examiner also points to the Berman reference at col. 12 lines 10 – 19 for further clarification.

Berman does not explicitly disclose the buffers occur in a secondary memory. However, as it was shown in the response to arguments section of the final rejection of the previous office action, the secondary reference, Zainouline, discloses a preview device having a secondary storage and it would have been obvious to combine Berman's buffer scheme in Zainouline's second memory. Therefore, while Berman doesn't explicitly disclose this buffer in a second memory, the combination of Berman in view of Zainouline does. For further clarification see Zainouline paragraph 31 and the final rejection of the previous office action.

Applicant also states:

Berman does not teach or suggest the limitations of Claims 1, 6 and 16 specifically:

3) as soon as the user skips to a target song whose first small portion has been pre-cached, start to play the first small portion of said target song.

Examiner respectfully disagrees. As shown in the final rejection of the previous office action dated 09 March 2005, Berman discloses permitting the user to skip to one of the other selected songs after playback as begun. Examiner also points to col. 12 lines 16 – 19 for further clarification.

Applicant also states:

Berman does not teach or suggest the limitations of Claims 1, 6 and 16 specifically:

4) at the same time start to download the rest of said target song so that as soon as the playing of the first small portion of said target song which is being downloaded from the server over the internet.

Examiner respectfully disagrees. As shown in the final rejection of the previous office action dated 09 March 2005, Berman discloses downloading the rest of the song as it is being played back. Examiner points to col. 11 lines 60 – 64 for further clarification.

Applicant also states:

Specifically, Berman does not teach the limitations that the data for the other selected songs is downloaded into separate buffers in an alternating fashion.

Examiner respectfully disagrees. This is exactly what Berman teaches. . As shown in the final rejection of the previous office action dated 09 March 2005, Berman states that the system downloads data for the other selected songs into the other buffers in an alternating fashion. For further clarification see Berman col. 12 lines 14 – 16.

### ***Conclusion***

This is a continuation of applicant's earlier application. All claims are drawn to the same invention claimed in the earlier application and could have been finally rejected on the grounds and art of record in the next Office action if they had been entered in the earlier application. Accordingly, **THIS ACTION IS MADE FINAL** even

though it is a first action in this case. See MPEP § 706.07(b). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no, however, event will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

To further clarify, the added limitations in claims 1, 6 and 16 of downloading in an alternating fashion into different buffer were clearly rejected in the Final Rejection of the Office action dated 09 March 2005. See page 2 of that rejection wherein it states "Berman discloses... ..and also download data for the other selected songs into the other buffers in an alternating fashion. Each song will be placed into a different sequential buffer (col. 12 lines 10 – 16)". Berman's teachings, which were clearly stated in the rejection, would have rejected the newly added limitations and thus these limitations could have been finally rejected in the previous action. As such, this action is made final.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Andrew C. Flanders whose telephone number is (571) 272-7516. The examiner can normally be reached on M-F 8:30 - 5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Vivian Chin can be reached at (571) 272-7848. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

acf

  
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